

Amendments to the claims

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of claims:

1 (Currently Amended) A method for increased therapeutic gain in chemotherapy [[and/]]or radiotherapy for proliferating malignant or nonmalignant disease ~~to produce high probability of tumor control with low frequency of sequelae of therapy,~~ comprising administering a composition [[of]] containing a histone hyperacetylating agent and a pharmaceutically acceptable carrier or a pharmaceutically acceptable salt thereof to a subject in need, wherein the therapeutic gain comprises preventing radiation or chemotherapy-induced complications or sequelae of mucositis, dermatitis, ulceration, tissue necrosis, fibrosis, xerostomia, plantar-palmar syndrome, and tumorigenesis, protecting normal tissues from cell death, and promoting radiation-induced wound healing in mucositis and dermatitis.

2. (Withdrawn) The method as claimed in claim 1, wherein the increased therapeutic gain is simultaneously enhancing tumor radiosensitization or sensitizing tumors to chemotherapy, increasing tumor growth inhibition, promoting wound healing in mucositis and dermatitis, preventing/reducing severity of plantar-palmar syndrome, decreasing tissue fibrosis, protecting normal tissue from cell death, preventing xerostomia, and suppressing tumorigenesis.

3. (Wthdrawn) The method as claimed in claim 1, wherein the hyperacetylating agent is a histone deacetylase inhibitor.

4. (Withdrawn) The method as claimed in claim 1, wherein the radiotherapy is teletherapy, brachytherapy, or ionizing radiation.

5. (Original) The method as claimed in claim 1, wherein the proliferating malignant disease is selected from a group consisting of melanoma, Kaposi's sarcoma, osteosarcoma, neuroblastoma, rhabdomyosarcoma, Ewing's sarcoma, Soft tissue sarcoma, skin cancer, lymphoma, leukemia, breast cancer, germ cell tumor, primitive neuroectodermal tumor, brain glioma, brain meningioma, head and neck cancer, thyroid cancer, thymic cancer, cervical cancer, anus cancer, colorectal cancer, prostate cancer, lung cancer, hepatocellular carcinoma, cholangiocarcinoma, stomach cancer, pancreatic cancer, esophageal cancer, virus-associated tumors, and disease receiving bone marrow transplantation.

6. (Withdrawn) The method as claimed in claim 1, wherein the nonmalignant disease is selected from a group consisting of pterygium, Graves' ophthalmopathy, orbital pseudotumor, macular degeneration, keloid, wart, keratoacanthoma, hemangioma, arteriovenous malformation, bursitis, tendinitis, desmoid tumor, Peyronie's disease, vascular stenosis, ameloblastoma, aneurysmal bone cyst, heterotopic bone formation, gynecomastia, ovarian castration, parotitis, eczema, atopic dermatitis, psoriasis, peri arthritis humeroscapularis, epicondylitis, knee arthrosis, hydradenitis, panaritium, autoimmune inflammatory arthritis, histocytosis X, and disease from receiving organ transplantation.

7. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is trichostatin A, or trichostatin C.

8. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is selected from a group consisting of oxamflatin, trapoxin A, FR901228, apicidin, HC-Toxin, WF27082, and chlamydocin.

9. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is selected from a group consisting of salicylhydroxamic acid, suberoylanilide hydroxamic acid, and azelaic bishydroxamic acid.

10. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is selected from a group consisting of azelaic-1-hydroxamate-9-anilide, M-carboxycinnamic acid bishydroxamide, 6-(3-chlorophenylureido)carboxylic hydroxamic acid, MW2796, and MW2996.

11. (Original) The method as claimed in claim 1, wherein the histone hyperacetylating agent is selected from a group consisting of sodium butyrate, isovalerate, valerate, 4-phenylbutyrate, Sodium phenylbutyrate, propionate, butyrimide, isobutyramide, phenylacetate, 3-bromopropionate, valproic Acid, and tributyrin.

12. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is MS-27-275 or the 3'-amino derivatives thereof.

13. (Withdrawn) The method as claimed in claim 1, wherein the histone hyperacetylating agent is depudecin or scriptaid.

14. (Original) The method as claimed in claim 1, wherein the administering is

non-oral.

15. (Original) The method as claimed in claim 1, wherein the composition is a cream, an ointment, a gel, a paste, a powder, a lotion, a patch, a suppository, a liposome formation, a suspension, a mouth wash, an enema, an injection solution, or a drip infusion.

16. (Original) The method as claimed in claim 1, wherein the hyperacetylating agent is from 0.001% to 100% by weight of the composition.

17 (Original) The method as claimed in claim 1, wherein the composition further comprises a second agent selected from a group consisting of a cytokine, an interleukin, an anti-cancer agent or an anti-neoplastic agent, an anti-angiogenesis agent, a chemotherapeutic agent, an antibody, a conjugated antibody, an immune stimulant, an antibiotic, retinoic acid, a tyrosine kinase inhibitor, a hormone antagonist, and a growth stimulant.

18. (Withdrawn) The method as claimed in claim 17, wherein the conjugated antibody is selected from a group consisting of Trastuzumab, c225, Rituximab, and Cetuximab.

19. (Withdrawn) The method as claimed in claim 17, wherein the chemotherapeutic agent is selected from a group consisting of an alkylating agent, a purine analog, a pyrimidine analog, a vinca alkaloid, a vinca-like alkaloid, etoposide, an etoposide-like drug, a corticosteroid, a nitrosourea, an antimetabolite, a platinum-based cytotoxic drug, an anti-androgen, and an anti-estrogen.

Applicant(s) : Yih-Lin Chung
Serial No. : 10/798,119
Filed : March 11, 2004
Page : 7 of 12

Attorney Docket No.: 55701-004002
Client Ref. No.: 0668-A20348US

20. (Withdrawn) The method as claimed in claim 17, wherein the anti-angiogenesis agent is selected from a group consisting of thalidomide, SU5416, SU6668, Thrombospondin-1, endostatin, and angiostatin.

21. (Withdrawn) The method as claimed in claim 17, wherein the antibiotic is Ganciclovir, Acyclovir, or Famciclovir.